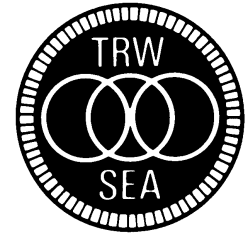




CROSSTALK

News Bulletin of the TRW Amateur Radio Club



Volume 98 Number 11

November 1998

Editor's Corner:

The 31st Annual Club Banquet is coming this month! There is an application in this issue in case you missed the separate mailing in October.

Licensing restructuring

I received 1 email in response from Floyd Sadler KD6GKS regarding the proposed Amateur Radio Licensing restructuring article that was in a previous **CROSSTALK**. Thanks Floyd

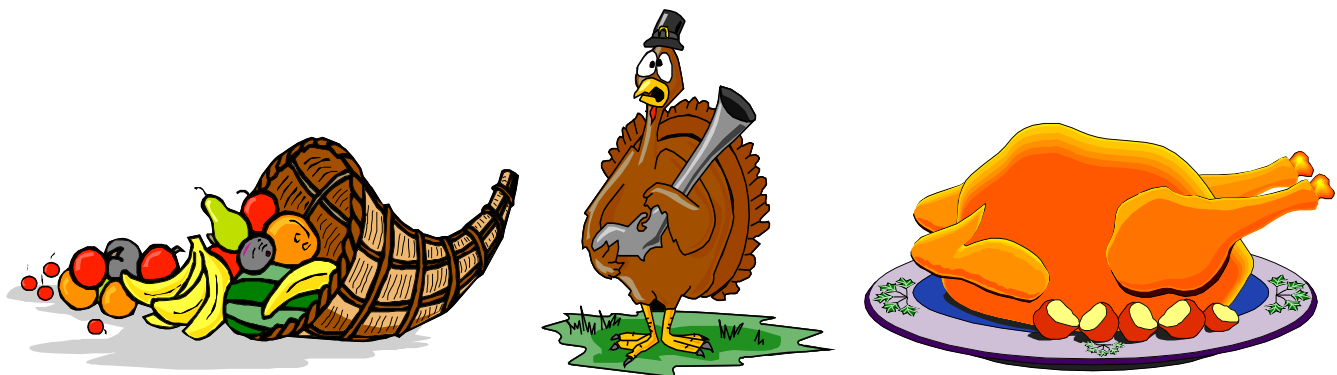
Club member receives coveted "Silver Snoopy Award"



Pat Anderson KB6YPI

Patrick Anderson, KB6YPI was one of nine members of the AXAF team that received Nasa's "Silver Snoopy Award" on September 23rd, 1998. Shuttle Astronaut Jeff Ashby of the STS-93 crew presented Pat and others this special award for their "Outstanding and Exemplary contributions to the safety and success of a manned space flight mission". Formally called the "Astronauts Personal Achievement Award", the "Silver Snoopy Award" is presented to less than one percent of the space industry's work force. STS-93 will deploy TRW's Advanced X-ray Astrophysics Facility Spacecraft (AXAF).

Duane Park WA6EIK Crosstalk Editor



HAPPY THANKSGIVING

TRWARC Monthly Calendar of Events

First Tuesday of each month	5:30 pm	Executive Board Meeting, R4/2041 (All Club Members are invited)
Second Tuesday of each month	-----	No meeting this month Due to the Banquet on November 21st
Second Tuesday of each month	12:00 noon	Emergency Communications Team Meeting R3 Emergency Operations Center
Last Saturday of each month	7:00 am	TRW/ARC Swap Meet Marine and Aviation (Northeast Corner)
After the Swapmeet	12:00 noon	T-Hunt Swap Meet Parking Lot - 144.72 MHz

Weekly Events

Every Monday Night (Except the 1st & Holidays)	7:30 pm	Disaster Communication Systems (DCS) Net DCS Members: Check in on 2 Meter Repeater
Every Wednesday	12:00 noon	ECT Net on 2 meter Repeater All Amateurs Welcome
Every Thursday	7:00 pm	Space Hams Net on 2 meter Repeater with N6SHI and W6EKK
Every Mon, Wed, Fri	2:00 pm	TRW Retirees Net 7185 KHz
Every Friday Morning	7:30 am	TRW Amateur Radio Club Breakfast Building S Cafeteria - Everyone is invited Talk-in on 2 Meters

Other Events

Computer Fair Hours: 10:00 to 17:00 (get a \$25.00 annual pass see:

<http://www.lacomputerfair.com/annpass.html>)

POMONA \$6.00 admission

Live Broadcasts: KFI-Jeff Levy "On Computers", KZLA, Y-107FM

November 14 & 15 (Sat. & Sun.) bldg. 4

Fairplex Exposition Complex Exit Highway 10 at Fairplex Drive.

Go north to McKinley Avenue, turn right. Turn left on White Avenue to Gate 14.

RESEDA \$3.00 admission

November 28 & 29 (Sat. & Sun.)

Sherman Square Entertainment Center From the 101 Freeway take the Reseda offramp,

go north to Sherman Way and turn right. Go one block to Canby Street. 18430 Sherman Way.

BUENA PARK \$5.00 admission

November 1 (Sun.)

Sequoia Conference Center Take the Beach Blvd. exit off the 91 Freeway.

Go one block north to 7530 Orangethorpe.

All Shows Open to the Public 10:00 a.m. to 5:00 p.m.

Call for more information (408) 778-5200 or 800-800-5600 Fax# (408) 779-1374

Other Ham Swap meets:

Inland Empire ARC - 2nd Sat. ea. mo. 7:00 to 11:30 AM @ A.B. Miller High School, Walnut & Oleander in Fontana Talk-in 145.480 (-600 pl=77.0hz)

EI Cajon ARC - 1st Sat. ea. mo. 6:00 AM @ Santee Drive-in Theater, Woodside Ave. @ Hwy 67 in Santee Talk-in 146.52

NEW: CAL POLY swap meet – 3rd Sat. ea. mo. 7-11am in lots F8,F9 and F10 @ CAL Poly Pomona at 3801 West Temple. Talk-in TBD (if you know, please email me... ed.)

Phase 3D Satellite to Begin Thermal-Vacuum Testing (via the ARRL)

GERMANTOWN, MD, Oct 21, 1998--Amateur Radio's Phase 3D spacecraft is scheduled to enter the test chamber today to see how it will withstand temperature extremes and the vacuum of space. The satellite has spent the past week being readied for the pre-launch test sequence at the Orbital Sciences Corporation test facility in Germantown, Maryland, just outside Washington, DC. The spacecraft was transported to Maryland by truck from the Phase 3D Integration Lab in Orlando, Florida.

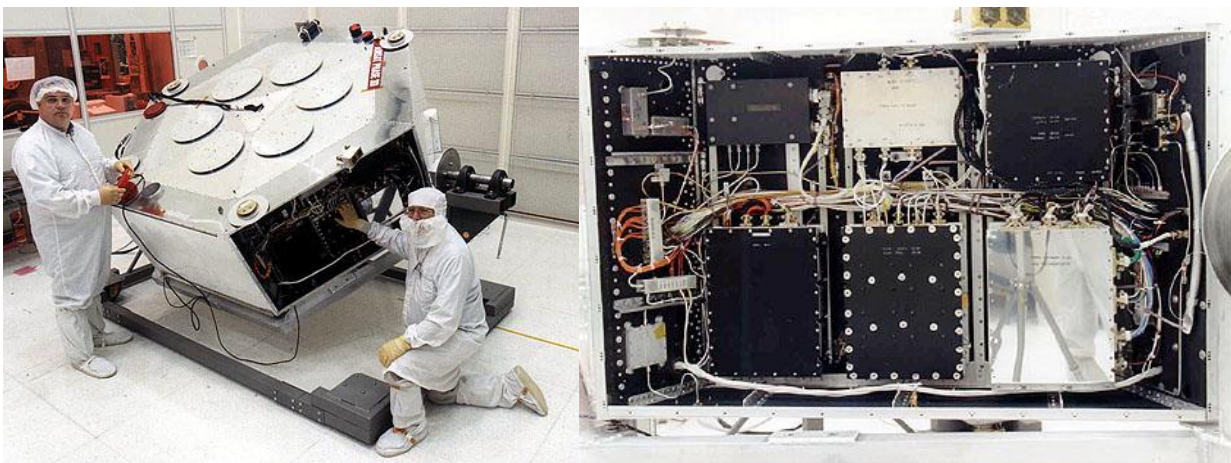
OSC Manager of Systems Integration and Test John Cavallo, KB3BWP, says that once a vacuum has been established in the test chamber, the satellite will undergo several testing cycles at both hot and cold temperature extremes. "It takes us about 24 hours to get down to vacuum," he said. After that, the spacecraft will be subjected to a maximum temperature of 45° C and a minimum of -20° C over five testing cycles. Each test cycle lasts approximately 36 hours, Cavallo said. AMSAT and OSC representatives will be on hand to monitor progress of the testing.

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While the satellite is "hidden" in the chamber for up to 10 days, P3D team members will be able to monitor the spacecraft's telemetry "just as they would if it were in orbit," McFadin said. "There will be several telemetries going" in the 2-meter satellite band.

"We look forward to getting this running," said McFadin, expressing the hopes of the amateur community.

For more information on Phase 3D, see the Phase 3D Spacecraft Integration Laboratory Web site, <http://www.magicnet.net/~phase3d/>.



TRW AMATEUR RADIO CLUB BANQUET RESERVATION REQUEST

Join us for the 31st Annual TRW/ARC Awards Banquet
Saturday, November 21st, 1998 5:30 PM to 10:00 PM

Buffet Dinner, Awards, Guest Speaker, Door Prizes, and Fun!

The Blue Moon
207 North Harbor Drive
Redondo Beach

An Employee Member may invite up to 2 guests. Non-Employee Members (including Retirees) may invite 1 guest. Due to limited seating, 2nd Guests *may* be bumped to make room for club members.

All reservation requests will be confirmed by mail no later than November 6th. If you do not receive a confirmation, please call Duane, WA6EIK, at (310) 813-4219 or Wendy, KQ6CG, at (310) 374-0795 to insure we received your reservation!

Return this portion of form ASAP! Reservations are First Come - First Served!!!

Club Member's Name: _____ Callsign: _____

1st Guest's Name: _____ Callsign: _____

2nd Guest's Name: _____ Callsign: _____

Address: _____

City: _____ State: _____ Zip: _____

TRW Mail Station: _____ Daytime Phone: () _____

Dinner Buffet includes Entrees, Salads, Side Dishes
Enclose \$12 for each TRW/ARC Member dinner.
Enclose \$15 for each Non-Member dinner.

Make checks (no cash please) payable to: **TRW Amateur Radio Club**

Send Reservation Requests to: Wendy Crawford
1637 Nelson Ave.
Manhattan Beach, CA 90266

Contributions by Jim Harrison K6OUE

The Southwest Ohio DX Contest Team will be operating from St. Lucia in the Caribbean from Nov. 24 thru Dec. 7, 1998 with call sign J68AS. Besides HF, they will have 1 KW on 6 meters! This would be a nice 6m contact to make from the club shack.

Pentagon Equipment Disrupts Phones

The Associated Press

WASHINGTON (AP) -- U.S. military technology deployed overseas is disrupting emergency telephone service in some countries and causing other telecommunications glitches, annoying allies and incapacitating some weapons, a defense-industry publication reports.

Quoting an internal Defense Department review, Defense Week said multibillion-dollar systems -- such as Patriot missile defenses and Predator unmanned aerial vehicles -- won't work to their full capabilities in some countries and, in others, can't be used at all.

That's because their radio waves clash with same-frequency users in host nations, the newsletter said in its edition to be published Monday.

``At least 89 telecommunications systems ... were deployed within the European, Pacific and Southwest Asian theaters without the proper frequency certification and host-nation approval,' ' it quoted the Defense Department's inspector general's report as saying.

This has caused telecommunications disruptions in Germany, Japan, South Korea and Bahrain.

Billions of dollars worth of equipment ``cannot be utilized to its full capability ... In some cases, fully functional equipment sits idle while its useful life expires,' ' the report said.

Pentagon officials said in written responses to the audit that they generally agreed with the criticism. They added that steps were being taken to deal with the problem, which they conceded was serious.

The officials said a key problem was that the United States has little control over which radio frequencies host countries allocate to other purposes, and that often these change after the systems are deployed.

The Patriot missile system's radios, radars and data-link terminals have interfered with Korean cellular phones. Pagers used by U.S. forces in Japan clash with Japanese aeronautical systems. In Germany, infant crib monitors used on U.S. bases have clashed with German telephone service, the report said.

In Bahrain, SPS-40 and SPS-49 radars ``are unusable because the equipment operates on a frequency that interferes with the Bahrain telecommunications services,' ' the report said.

Unless the conflicts are resolved, it said, some U.S. air defense systems may be unable to do their jobs.

Host nations are angry about the disruptions, the report said. Germany has passed a law allowing it to confiscate U.S. equipment using frequencies not approved and to arrest the user. And Saudi Arabia barred the United States from using a \$1.4 million satellite-communications device because it had not gotten frequency rights.

AP-NY-10-17-98 1323EDT

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Contribution by Paul Lukas N6DMV

On Sept. 11-12-13 I attended an international Ham Radio Conference held yearly in Hungary at the western border of the country not too far from Vienna, Austria in the charming hilly, forest encircled city of Sopron (pronounced: Shopron). Among other things, the area is known for its excellent wines and beers. 5 of us from here were representing the States, ham visitors from all over the world showed up, even from Australia. After the event 3 of us went to stay at Eastern Europe's largest lake, the Balaton. I have brought with me my newly acquired HF rig + antenna wire. Since it rained heavily, I refused to climb slippery steep rooftops to stretch an antenna wire between the chimneys. At a closer look, I discovered a rain gutter overhead, about 12 feet long, with a 5 foot downspout. My ham friends were nearly hysterically laughing at me when I declared the gutter as my HF antenna. With a "C"-clamp I attached a wire to the spout, the other end to my small Dentron Jr. antenna tuner. Ground was provided by an 8' long braid tied to the cold water pipe in the washroom. Needless to say, I could achieve a perfect match on all bands! 5 minutes and some 805s later after the "antenna" was connected, I was talking to RU, JA, GW, G0 and TA stations, and one by the callsign of H2T (whatever that is) in contest! The Turkish fellow asked me what am running - I beat the pileup flat! He asked me three times if he heard it right: 100 watts into a rain gutter full of water, pointed in NE-SW direction, off from Turkey! (The water was flowing in the trough nearly in his direction, though). The spout was riveted *and* soldered to the main body of the one piece gutter, providing a solid connection, the VSWR was absolutely flat 1:1 over the 20M band of my water-cooled antenna!

gud dx / 73 Paul / N6DMV / HA5CCV

Contribution by Greg Shreve

Thanks are due to a truly team effort for making the ATV demo at Round Table a success on Tuesday 13 October. Steve Papa, Willard Washburn, Elizabeth Kunkee, Jim Harrison, Calvin Hashi, and myself were mostly the core team that provided knowledge and action to get it up and running. My apologies if I left out mention of any contributors to this experiment. Eventually, when the ATV is permanently installed in the van, getting on the air should just be a matter of flipping a few switches, as we do today in the building S shack. But this field setup was somewhat more of a challenge. We also could see the need for eventually having a good telescoping tower on the van, as we were just barely able to achieve line of sight / knife edge to the repeater due to a nearby building, using a temporary tower and too-short coax cables.

Via ATV, we interacted with several of the regulars on the Santiago Peak ATV repeater, and it was informative and entertaining when they described their ATV stations to the group over the air. We were able to transmit back to them our picture, of somewhat modest quality with 10 watts and a small transmit antenna, but sufficient that the repeater viewers could see that there was a group of us there being informed. We also got to experience the ease of the interaction on ATV where one party transmits video and audio while the viewing party (the W6TRW people, in this case) can interact via 2 meter talkback in full duplex, in a very natural video teleconference mode. It still amazes me that here in Los Angeles, if a person can get an antenna on his roof with line of sight to Mt Wilson or Santiago Peak (or about 3 other local repeaters), they can participate in full motion teleconferencing (with other ATVer's) for well under \$1000, and can sometimes link to the Las Vegas ATV repeater group as well. Hard to imagine that there are not more people on the air in this mode. You can get the antenna and downconverter for viewing the repeaters only, for just about \$220, and that is sometimes entertaining, especially on the relatively rare occasions when someone is transmitting from the field instead of a base. One good example of this is the Pasadena Tournament of Roses Parade, where it is possible to see some of the ATV video feeds from either Mt Wilson repeater or from a temporary repeater that they set up for that event.

-- Greg Shreve KE6YEX

Another restructuring request *(via NEWSLINE #1104)*

The National Conference of Volunteer Examination Coordinators has filed what some see as controversial comments to the FCC's over the agency's Amateur Service streamlining proposal. It's a massive 37 page document that suggests doing away with 13 and 20 word per minute Morse code testing. As Hap Holly, KC9RP of RAIN suggests, it may really amount to another restructuring proposal unto itself:

The National Conference of VEC's Restructuring proposal calls for reducing the number of Amateur Radio licenses classes from 6 to 3. It also calls for abolishing the 13 and 20 wpm code test. Fred Maia, W5YI is the coordinator for the well known W5YI VEC.

"Novice would be phased out. Tech plus would be abolished. All Tech Plus licensees would be renewed as Technician. The Technician class would consist of 50 questions from the Element 2 & 3A pool. The General Class would have 50 questions 5 wpm. The Extra class would have 100 questions and 5 wpm." Fred Maia, W5YI

According to Maia, removing 13 & 20 wpm code testing would eliminate a major headache for VEs. "The ARRL says 8 percent of all their applicants come to examination sessions with a code wavier. Well I don't know if it is that high, but I do know that there are a lot of them. It presents a problem. For the VE Team it presents a problem, for the VECs. Because we have no way of knowing, nor are we qualified to determine whether a person is legitimately handicapped or not." W5YI

You can hear my RAIN Report interview with Fred Maia, W5YI now on the internet at:

www.rainreport.com and telephonically at: (847) 827-RAIN

DoD may help save ham bands *(via NEWSLINE #1104)*

A demand by the Department of Defense to be paid in advance for any spectrum that it agrees to reallocate may help protect the rights of radio amateurs. This is the result of the wording of the fiscal year 1999 Defense Authorization bill that says the Department of Defense will receive reimbursement from private companies seeking to buy sections of spectrum that agency was ordered to offer for auction.

But the kicker is that the costs associated with offering the spectrum for auction will be charged to the purchaser. Also the purchaser must compensate the Federal agency in advance for the expenses.

The estimated costs for such compensation could run into the billions of dollars and could lessen interest by many potential bidders. Since much of the spectrum that ham radio occupies is allocated to the Department of Defense, amateurs could see some worthwhile spectrum protection from this action on the part of the Defense Authorization Committee.

TRW AMATEUR RADIO CLUB

ELECTED OFFICERS

President	Rich Sauer	N6CIZ	R9 / 2873	(310) 813-5869
Vice President	Elizabeth Kunkee	KS4IS	D1 / 1024	(310) 813-0524
Secretary	Craig Gullickson	N6ED	R6 / 2529F	(310) 812-5389
Treasurer	Steve Lambert	KF6KIC	R6 / 2529	(310) 812-5019

APPOINTED STAFF

447 Repeater Autopatch	Duane Park	WA6EIK	M2 / 1555E	(310) 813-4219
Activities Chair/Asst Swapmt	Greg Martens	N6RRY	M1 / 1275	(310) 813-4049
Crosstalk Editor	Duane Park	WA6EIK	M2 / 1555E	(310) 813-4219
Emer. Comm. Coordinator	Rich Sauer (acting)			
Librarian	Steve Papa	KO6VF	O2 / 1715	(310) 812-5305
Membership Chairperson	Dave Nelson	AB6DU	R8 / 2144	(310) 813-9775
Past President	Bob Briggs	KD6WYQ	M7 / 2939	(310) 813-2622
Publicity Chairperson	Dave Nelson	AB6DU	R8 / 2144	(310) 813-9775
QSL Manager	Bryan DeAro	KN6OW	120 / 1020B	(310) 812-4789
S.P. Packet/Internet Sysop	Chris Wachs	WA2KDL	R7A / 2100	(310) 813-1506
SEA Representative	Nina Whiddon	KN6FL	01 / 2020	(310) 813-9351
Swap Meet Manager	Rich Sauer	N6CIZ	R9 / 2873	(310) 813-5869
Technical Chairperson	OPEN			
Training Chairperson	Bryan DeAro	KN6OW	120 / 1020B	(310) 812-4789
Trustee of W6TRW License	Elizabeth Kunkee	KS4IS	D1 / 1024	(310) 813-0524

TRW/ARC Hotline (Club Answering Machine) (310) 813-8569
W6TRW 2 Meter Repeater (Open Repeater) 145.32 (-600) PL 114.8Hz
W6TRW UHF Repeater (Open Repeater / Closed Autopatch) 447.00 (-5 MHz) PL 100 Hz
W6TRW-3 Packet Radio Internet Gateway and BBS (1200 Baud Port) 146.745 (-600)
W6TRW Internet Home Page <http://w6trw.sp.trw.com/w6trw/>

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